Operator Training

Groundwater Monitoring

D H E C

PROMOTE PROTECT PROSPER

South Carolina Department of Health
and Environmental Control

Release Detection

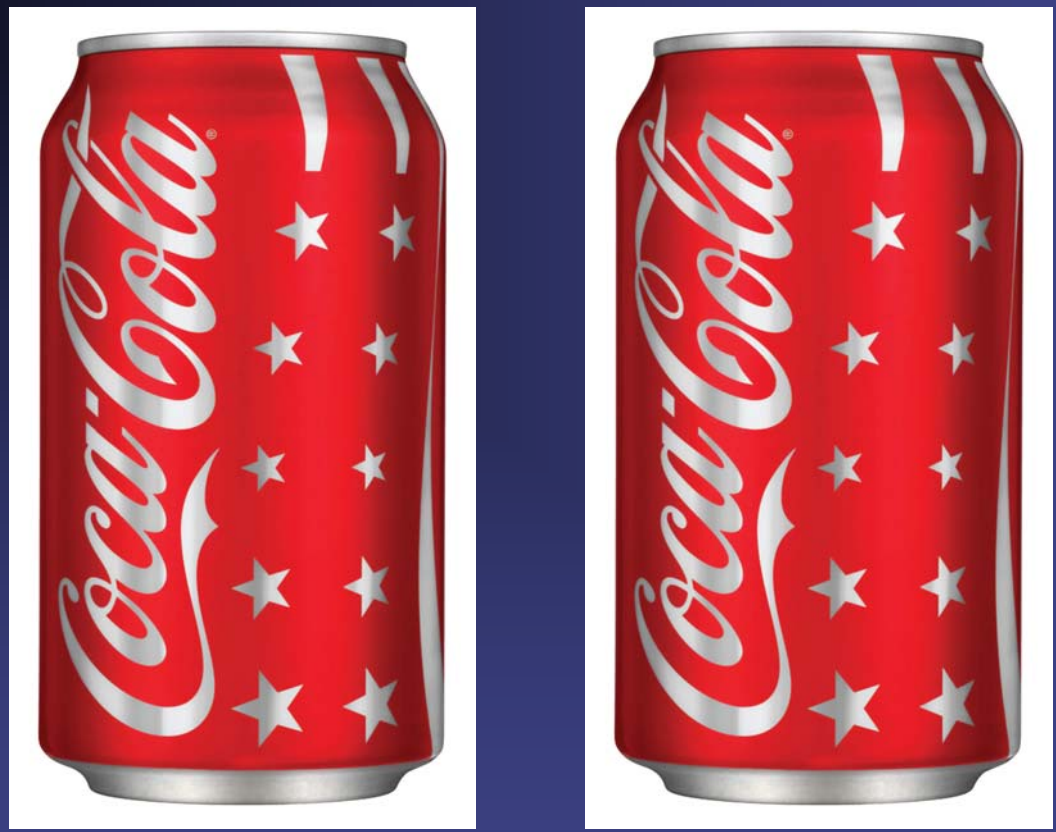
- Means watching the tank system on a routine basis so that if a release occurs, it will be discovered as quickly as possible
- All tanks are required to have release detection except tanks that serve as emergency generators

Release Detection Requirement

Must use a method and/or equipment capable of finding a leak of 0.2 gallons per hour (gph) within 30 days

How much is 0.2 gallons per hour??

Release Detection



A leak of 0.2 gallons per hour is the same as losing 2 cola cans worth of fuel in an hour

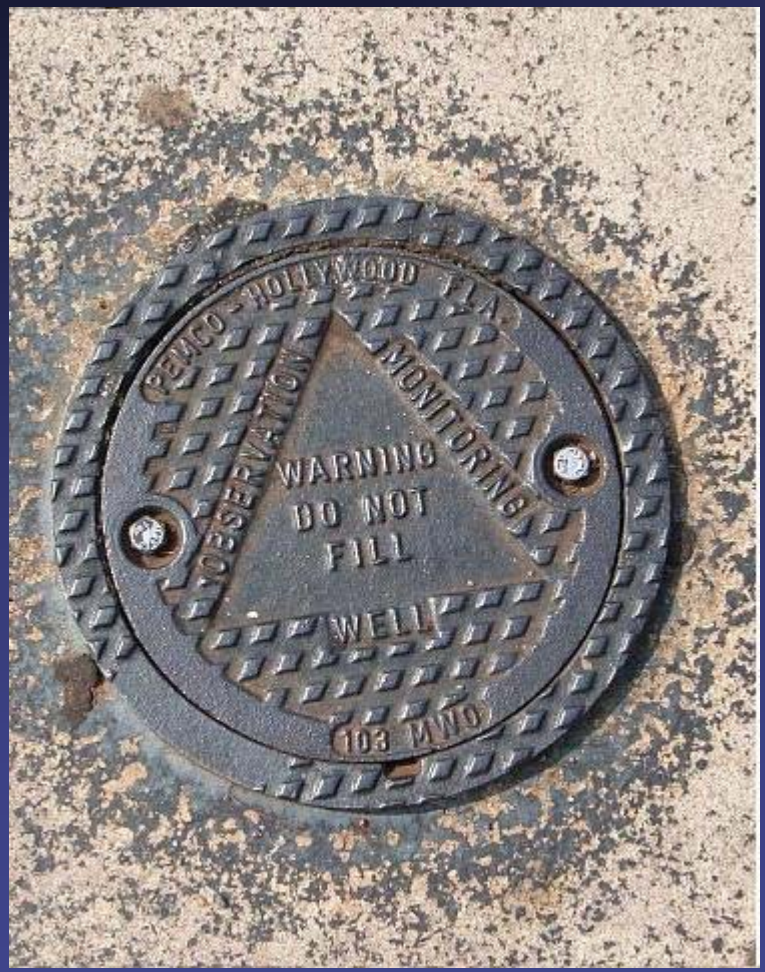
Release Detection

Release detection requires that we look for a 0.2 gph leak at least once every month…

0.2 gph x 24 hours x 30 days =

144 gallons per month

Groundwater Monitoring



Groundwater monitoring uses permanent monitoring wells installed in the ground surrounding the tank system to detect the presence of fuel floating on groundwater.

Groundwater Monitoring

Detection devices may be permanently installed in wells for automatic, continuous measurement. Manual detection devices, such as a bailer, may also be used to collect a liquid sample for visual inspection.

Groundwater Monitoring

- Requires a site assessment before implementing
- Groundwater can never be more than 20 feet from the ground surface at all times and must always remain accessible within the well
- Can only be used if the fuel stored floats on top of water and does not easily mix with water

Groundwater Monitoring

- Monitoring must be done at least once a month
- Measurements should be made to 1/8th of an inch
- At a minimum, a written log must be kept indicating monitoring results
- At a minimum, the most recent 12 months of monitoring records must be on file at all times